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News Summary

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Field workers are trying to use all available information to predict famine in sub-Saharan Africa. Page A5.

Although many in Congress support the idea of tax-free college savings plans, there's little chance one will be approved this year. Page A23.

The Bush Foundation, one of the nation's largest philanthropies, has taken the unusual step of opening itself to the ideas and criticisms of outsiders. Page A29.

"Les Gourmets," an annual feast prepared by students at Michigan State U., reflects a new interest in hotel-restaurant schools. Page A33.

The sports association for two-year colleges is expected to vote to strengthen academic-eligibility rules for athletes. Page A35.

The former football coach at West Texas State University was cleared of wrongdoing in the death of one of his players. Page A35.

The Soviet Minister of Higher Education will head a new agency in a change expected to produce a leaner bureaucracy. Page A37.

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IRS Ruling Advances Mich. Tuition Plan but Could Quash Other States' Programs

By SCOTT JASCHIK

WASHINGTON

Gov. James J. Blanchard of Michigan announced here last week that the Internal Revenue Service planned to allow parents to participate in his state's prepaid-tuition program without paying additional federal income tax.

Legislators and college officials across the country have been anxiously awaiting the ruling. Many states had put their consideration of prepaid-tuition plans on hold because they were concerned that parents could be subject to federal income taxes on the interest that states would earn from the payments.

Even though the I.R.S. told Governor Blanchard that parents could receive tax breaks by prepaying college tuition, other technicalities in the agency's ruling made it unlikely that either states or private colleges would have much incentive to establish such plans, some experts said.

The Michigan program was proposed by Governor Blanchard, a Democrat, in 1986. Parents (o her state residents wanting to help finance a child's education) would pay the state a fixed amount of money years before their children enrolled in college, in return for a guarantee of four years' worth of tuition at a public college or university in the state.

Students who enrolled at other colleges would receive an amount equivalent to the tuition costs at four-year institutions in Michigan.

In late 1986, the Michigan Legislature

Continued on Page A27

U. of Minn. President Resigns Amid Criticism of Building Projects

By DEBRA E. BLUM

Kenneth H. Keller, the architect of a long-term plan aimed at making the University of Minnesota one of the nation's very top public institutions, resigned as president last week, amid controversy over a $1.7-million renovation of his campus office and official residence.

Mr. Keller stepped down just days after the release of a state legislative audit that outlined cost overruns and questions about university spending policies that had plagued the two renovation projects under his direction.

In a resignation statement delivered at a press conference, Mr. Keller said he was "profoundly embarrassed and profoundly

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University for Deaf Chooses First Hearing-Impaired President

After protesters shut down the campus of Gallaudet University and forced the newly elected president to resign, trustees chose a Gallaudet dean, Irving King Jordan (*right*), to be the first hearing-impaired president of the world's only university for the deaf.

- Alumni, professors, and staff members also protested, but four students controlled the movement.
- The university's "academic integrity" was breached, say two Gallaudet leaders who resigned.

Stories on Page A13

PHOTOGRAPH FOR THE CHRONICLE © 1988, SAM KITTNER

Reagan Vetoes Bill Expanding Scope of Anti-Bias Laws

House and Senate are expected to override President's action

By COURTNEY LEATHERMAN

WASHINGTON

President Reagan last week vetoed a civil-rights measure that would expand the scope of federal anti-bias laws governing colleges and other institutions that receive federal aid.

Both the Senate and the House of Representatives are expected to vote this week on whether to sustain or override the veto. Congressional leaders said both chambers were likely to vote to override the veto.

The bill the President vetoed was intended to counteract the effects of a 1984 Supreme Court decision involving Grove City College. In that decision, the Court said a federal law barring sex discrimination at educational institutions that receive federal support applied only to programs receiving direct federal support, not to the entire institution. Under the decision, a university's biology department would not be in danger of losing a federal research grant, for example, if the athletics department violated anti-bias laws.

Alternative Bill Proposed

The bill passed by Congress specifies that an entire institution must comply with federal anti-discrimination laws if any part of it received federal aid.

Leaders of civil-rights groups strongly attacked the President for vetoing the measure.

In a statement that accompanied the veto, the President said the measure passed by Congress would "vastly and unjustifiably expand the power of the federal government over the decisions and affairs of private organizations, such as churches and synagogues, farms, businesses, and state and local governments.

"In the process, it would place at risk such cherished values as religious liberty."

Mr. Reagan proposed an alternative bill that he said "takes particular care to avoid

Continued on Page A26

For Many Public Colleges, Construction and Renovation Are Now Top Priorities

Faced with crumbling, outdated buildings, many public higher-education systems this year are giving the construction and renovation of their facilities a top priority—in many cases for the first time in two decades.

Across the country, public colleges and universities are seeking the authority to issue hundreds of millions of dollars' worth of bonds to pay for construction projects. Those requests are emerging as one of the major higher-education issues in legislative sessions this year.

For higher-education officials, such requests can be rife with political pitfalls. The construction plans must satisfy enough interests on the campuses to insure broad inside support for the effort. They must satisfy legislators—as well as the voters, in some states—that the new buildings are economical, up to date, and urgently needed. And they must move very quickly because construction costs continue to rise.

1960's Facilities Are Falling Apart

The problem of inadequate facilities is hardly unique to public colleges and universities. A survey last year by the Society for College and University Planning found that 60 per cent of the nation's college planners saw the need for new or modernized facilities on their campuses as "extremely urgent" or "very urgent."

The survey found that many of the buildings constructed during the rapid growth of campuses in the 1960's are now falling apart. In addition, it found that advances in technology and new state health regulations have created more of a demand for improved facilities (*The Chronicle*, July 29, 1987).

Public-college officials say their buildings are in worse shape than those of most

Continued on Page A24

MARGINALIA

From a blizzard story in the Grand Forks, N. D., *Herald*:

". . . The storm stranded one of the vans carrying the UND basketball at a rest area on I-29 between Wahpeton and Grand Forks."

Well, it's a very large basketball, see? So they hitch together two vans, see? . . .

■

"Positions Available" notice in our pages:

KING SAUD UNIVERSITY
AL-GASSEEM CAMPUS
College of Business and Economics
Announces Faculty Openings
ALL AREAS OF
BUSINESS ADMINISTRATION
Attractive Salaries & Benefits
Men, Women, & Couples Preferred

That about covers it.

■

Note in *Scope*:

"HUMANIST, an international electronic discussion group, links those who support computing and the humanities through the Bitnet / NetNorth / EARN node in Toronto. To join HUMANIST, send an e-mail note to Willard McCarty at MCCARTY@UTOREPAS.BITNET, giving a brief professional bibliography."

We (*sob*) hardly know where to start.

■

From the Washington State University *Daily Evergreen*:

"COLFAX—During an emotion-packed hearing, the Whitman County Superior Court judge said Tuesday he will not sentence the man who stabbed a Pullman resident last October.

"Judge Wallis Friel told a court he will step down from the case because he has been accused of being impartial."

Shame!

■

From *The Good Se Cigar* ("Just what this country really needs"), a newspaper at the University of Rhode Island:

"The proposed creation of a new division by combining the department of Student Affairs and University College has some University officials unhappy. . . .

"Marguerite Bumpus, acting vice president of Student Affairs, said, 'Whenever anyone proposes change it poses a lot of questions . . . and it should. You don't want change just for the sake of change. You want change because it's going to improve conditions.'

"The Dean of UC, Diane Strommer, said that she feels that the University has safeguards to avoid such results."

That's a relief. —C.G.

In Brief

Government Settles Suit Against D-Q University

A six-year-old legal effort by the federal government to seize the 643-acre campus of D-Q University has ended in a settlement that divides the property between the college and the government.

The university is operated by and for American Indians. It is located near Davis, Cal., on an old Army base given to Indian activists in 1970.

The government sought to regain possession of the property on grounds that it was not being used for educational purposes, as had been specified in the agreement granting title to the activists. A federal judge ruled against the government in 1984, and settlement negotiations have been in progress for the last three years.

Under an agreement approved in federal court, the college's half of the 643 acres will contain all of the campus buildings. The land was placed under trust restrictions that require the university to use the land for educational purposes and to maintain certain enrollment levels until 2001.

The property to be given to the government will be offered for sale. That will give the university an opportunity to buy the land back, said Louis Demas, assistant U.S. attorney in Sacramento.

Klansmen's Appearance Sparks Protest in Kansas

An appearance by two members of the Ku Klux Klan at a student forum at the University of Kansas led to a demonstration that involved as many as 3,000 people.

The forum was scheduled after students protested invitations to the two Klan members to participate in a talk show broadcast over the student radio station and to address a journalism class. As a concession to the protesters, the radio reporter and the journalism professor agreed to hold their meetings with the Klan members off the campus.

Thousands of people demonstrated outside the auditorium during the forum, which was devoted to freedom of expression in the university environment. Inside, a predominantly black group in the audience sang spirituals and civil-rights songs for 1½ hours while the forum was in progress, a university spokesman said.

Grand Jury Clears 5 in Bentley Rape Case

A Massachusetts grand jury has declined to indict five Bentley College students accused of raping an 18-year-old woman in a dormitory room in January.

"The matter is now closed," said Thomas Samoluk, a spokesman for the Middlesex County district attorney.

The woman had attended several parties on Bentley's campus in suburban Boston. She left with female friends and then returned to the dormitory alone.

Wheaton May Enroll Men Despite Suit, Judge Rules

In spite of a court challenge to its use of alumnae donations to pay for coeducation, Wheaton College will send out letters of acceptance to both men and women for next fall's classes.

A Massachusetts judge has approved an order allowing the former women's college to proceed with plans for admitting men next fall while the nine alumnae continue their case in court. (*The Chronicle* reported incorrectly last week that the first men had been admitted in the fall of 1987.)

The nine Wheaton graduates, who donated money to a capital campaign marking the institution's 150th anniversary, say their contributions were intended for the education of women. Together, the women contributed $140,000 of the $26-million raised by the drive.

Virginia's Fine Reduced in Nuclear Incident

The Nuclear Regulatory Commission has reduced from $2,500 to $1,250 the fine to be paid by the University of Virginia as a result of an incident at the university's reactor last July.

Several employees were briefly exposed to low levels of radiation during the incident, which began when a mechanical failure allowed water that normally cools the reactor to drain from it. The commission later charged that the university had failed to control access to an area in which high levels of radiation could occur.

The fine was reduced, the commission said, because the university had promptly made both administrative and technical changes to assure that such an incident could not occur again.

Cal. State System Lowers Admissions Requirements

The California State University system has eased admissions requirements on its 19 campuses to enable the system to offer admission to the number of students required by state guidelines.

The minimum grade-point average for required high-school academic courses was lowered to 3.0 from 3.11. Minimum Scholastic Aptitude Test scores also were adjusted downward.

The system is obligated to offer admission to the top one-third of graduating high-school students in the state, but in recent years only 27.5 per cent of the high-school graduates have been eligible. Officials said the reason was that students had had to take more academic courses under new high-school-curriculum requirements imposed by the state, and that their grades have suffered accordingly.

Harvard in New Program With South African U.

Harvard University education professors will collaborate with black South African educators in a three-year project to improve the mathematics and science skills of high-school students in South Africa. The project will be based at the University of the Western Cape.

According to Merlin Mehl, who is the director of the Gold Fields

NOTES ON THE ARTS

Quake Protection; Tracker Organ; Art and Prose

New reinforcing techniques are expected to make the oldest building on the University of California's Berkeley campus much safer during major earthquakes.

The building is South Hall (*right*), which was designed by David Farquharson in the style of the French Second Empire. It was completed in 1873, and was the first university structure in California built with state money.

SAXON DONNELLY

Like many brick buildings, however, it had been considered dangerous during earthquakes. To reinforce its walls, technicians are drilling holes through them, from top to bottom, and filling the holes with steel. The steel will be bonded to the brick by a grout made of polyester resin and sand.

A spokesman for the university said the $3.8-million project might serve as a model for efforts to reinforce other brick buildings in California.

■

A tracker organ built by one of North America's most prominent organ makers has been installed in the newly renovated chapel at Kalamazoo College.

The three-manual instrument has 42 stops and over 3,000 pipes. They are activated by trackers—thin strips of wood that connect the manuals and the pipes—rather than by an electro-magnetic action.

The builder, Hellmuth Wolff, is a well-known proponent of tracker organs, and the $420,000 instrument at Kalamazoo is his largest to date. Mr. Wolff is a native of Switzerland who now lives in Laval, Quebec.

Paula Pugh Romanaux, the college's organist, says the instrument is "eclectic in the very best sense of the word." It is intended for use in concerts, weekly chapel services, and Kalamazoo's annual Bach festival.

Ms. Romanaux adds that it has "a decidedly French voice" that makes it particularly well suited to works by French composers of the Romantic era.

Ms. Romanaux says she and the director of the Bach festival, Judith Breneman, were astonished to discover after the organ had been installed that Mr. Wolff had carved their likenesses into the pipe shades. "Organ builders used to do this in the 18th century for wealthy patrons," she says, "but I haven't heard of its being done at all in the past 200 years."

■

"About suffering they were never wrong, the Old Masters."

So begins W. H. Auden's "Musée des Beaux Arts," one of the best-known poems ever written about a painting. In it, Auden both described and annotated Brueghel's "Icarus," noting "how everything turns away/ Quite leisurely from the disaster." Auden needed only 21 lines for the poem, which many consider a masterpiece in its own right.

Now the University of Virginia's Bayly Art Museum, hoping to persuade patrons to give more attention to individual works in its collection, has organized a contest in which museum-goers write poetry or prose about any one of 27 pieces of art. In addition to taking home cash prizes and gift certificates, each winner will read his or her writing in front of the work that inspired it.

The contest is based on a similar program at the Tate Gallery in London, a spokeswoman for the museum said. She added that its goal was not to attract writing of Auden's quality but instead to make people "really stop and look at a work of art."

The contest received about 290 entries. The names of winners will be announced next month. —L.B.

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Footnotes

Problems at work would be resolved so much more easily, say two communications researchers at the University of North Carolina at Greensboro, if people just took the time to learn about each other.

"Many organizations have a crisis mentality—they bring people together to discuss problems *when* there are problems," says Elliott A. Pood, associate professor of communication studies. "In fact, they need to spend a lot of time building up communication channels and getting people to know one another *before* conflict occurs."

In a series of studies of employees in an insurance company in North Carolina, Mr. Pood and his colleague, Michael J. Papa, assistant professor of communication studies, have been attempting to develop a new approach to organizational conflict.

In the studies, they observed pairs of employees discussing a company reorganization plan that had provoked heated debate on both sides.

Among other things, the researchers found that the more each of the parties understood about the other's perspective beforehand—a condition the researchers call "co-orientational accuracy"—the more likely they were to come to a solution that satisfied both of them.

Timing is important, Mr. Pood notes, because the process of trying to clarify positions as a conflict is going on has a tendency to escalate the conflict.

Many companies, he says, think of employee communications as a project to be taken on after normal business is taken care of. But, in fact, he says, "it's not a fringe benefit."

■

To have a child missing may be the most heartbreaking trauma a family can endure, but, oddly, scientists know little about the specific psychological effects of such a loss on parents and siblings.

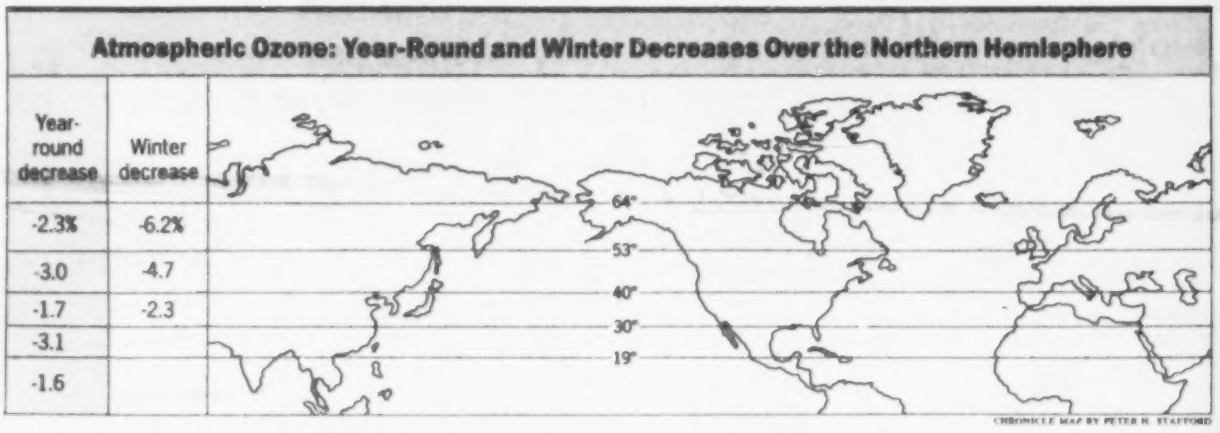
To help fill in the blanks, the federal government's Office of Juvenile Justice and Delinquency Prevention has given a $1.25-million grant to researchers at the University of California at San Francisco for a three-year study of the psychological problems that occur when a child is kidnaped or runs away.

Beginning in April, said Chris Hatcher, a clinical professor of psychology at San Francisco and the principal investigator, researchers will be interviewing families in missing-children programs across the country. As a comparison, they will also be studying 50 families who have lost a child through sudden death.

A good deal of the focus of the study will be on the process of abduction, Mr. Hatcher said.

Researchers, for example, will be working with any children who are returned during the course of the project to try to determine what protective psychological mechanisms help insulate certain ones from severe emotional trauma.

Scholarship



A New, Unexplained Loss of Ozone in Wintertime Is Discovered Over the Northern Hemisphere

Depletion was not predicted by current theories about the atmosphere; likely to worsen after 1991

WASHINGTON

Just as atmospheric scientists had come to believe they could conclusively blame Antarctica's springtime ozone hole on manmade chemicals, a new and unexplained loss of atmospheric ozone in the winter has been discovered over the Northern Hemisphere.

When atmospheric ozone levels in the winter of 1986 at northern latitudes were compared to those at the same latitudes in the winter of 1978, they were found to have dropped by rates ranging from 2.3 per cent to 6.2 per cent. The ozone depletion was most severe at the more northern latitudes.

The winter drop in ozone was not predicted by the current theories or models of atmospheric scientists.

The new findings on ozone depletion were released last week in a report by an "Ozone Trends Panel" of more than 100 scientists convened by the National Aeronautics and Space Administration and other federal and international organizations. The report also predicted that the drop in ozone would let up and then grow worse after 1991.

The decreases in atmospheric ozone, which shields out some ultraviolet radiation from the sun, might result in increases in skin cancer over many years. But, other than that, scientists are unsure about just what the effect of ozone depletion on the climate, plants, ocean life, and human health might be.

Absence of Instruments in Arctic

Scientists are also unsure about the extent of ozone depletion over the Arctic, or over much of the Southern Hemisphere outside of the Antarctic, because of an absence in those regions of ground instruments to measure ozone changes.

An emergency scientific expedition to the Arctic, similar to the trips made to the Antarctic for the past two years, is being planned for next January and February. The expedition, which will probably be based in Norway, will try to determine whether ozone is being stripped from the stratosphere as air moves over the North Pole.

F. Sherwood Rowland, a professor of chemistry at the University of California at Irvine and one of the first to suggest that manmade chemicals might cause ozone depletion, said he suspected that air moving through the Arctic might be going through the same chemical reactions that take ozone, a form of oxygen, out of the air near the South Pole. Because Arctic air is not trapped in winter for as long as Antarctic air is, he said, the ozone depletion will probably not be as severe in the north.

In the Antarctic, springtime sunlight sets off a chemical reaction in the cold, isolated air containing manmade chemicals and ice crystals. The reaction removes as much as 95 per cent of the ozone at some altitudes during the Antarctic spring. Last year's springtime "hole"—the region of severe depletion—was the longest-lasting and most severe since measurements began.

Previous to the new NASA study, at least two scientists, using interpretations of data from satellites, suggested that ozone levels might be dropping in regions outside the Antarctic. The new study is considered more authoritative because it analyzed all of the data available from satellites and ground stations.

Calculations made for the report predict that atmospheric ozone levels will, in general, stay the same or increase until 1991.

Increases in solar radiation also increase the amount of ozone in the atmosphere, since the radiation breaks down the larger oxygen molecules into the smaller ozone molecules. Increases in solar radiation expected between now and 1991, part of 11-year sunspot cycles, will create enough ozone to offset the loss expected from manmade gases. But a decline in solar radiation after 1991, combined with the manmade gases that will have accumulated, are expected to make ozone levels drop sharply then.

Although scientists are finding that ozone depletion has occurred and will occur in the future over population centers—over North America, Europe, and the Soviet Union and spreading up from the Antarctic over New Zealand, South America,

Continued on Page A8

White House Defends Proposal to Protect Data of Researchers at Federal Laboratories

By KIM McDONALD

WASHINGTON

President Reagan's science adviser last week called on Congress to protect the interests of government scientists who, he said, are being compelled to turn over data to researchers from other countries under the Freedom of Information Act.

"I have heard of cases where laboratory notebooks have been requested under the Freedom of Information Act and taken from them," said William R. Graham, Jr., director of the White House Office of Science and Technology Policy.

"This is an unbelievable prejudice against government scientists that no university or industrial laboratory would condone."

Mr. Graham made his comments to the Subcommittee on Technology and the Law of the Senate Judiciary Committee in defense of a White House legislative proposal that would allow federal laboratories to withhold from foreign competitors certain kinds of scientific and technical information of commercial value.

White House officials said the proposal, which was included in the "Superconductivity Competitiveness Act of 1988" that Mr. Reagan sent to Congress last month, was intended to help U.S. industry commercialize recent scientific advances in superconductivity by protecting the proprietary rights to scientific information generated at federal laboratories.

But academic and industrial scientists told the subcommittee that such a revision of the information act would have just the opposite effect.

Robert L. Park, a physics professor at the University of Maryland at College Park who heads the Washington office of the American Physical Society, said one immediate effect of the revision would be to isolate researchers at federal laboratories from the rest of the scientific community.

Informal Channels

"In a rapidly moving field such as superconductivity," he said, "progress depends in large part on the informal exchange of ideas and results. Such informal channels are quickly severed if there is a perception that information from one side may be withheld."

That could be disastrous, he said, because many of the recent developments in

Continued on Page A8

Loss of Atmospheric Ozone in Winter Discovered in Northern Hemisphere

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and Australia—they are unsure about how much extra ultraviolet radiation, which is usually absorbed by ozone, is reaching the earth. They estimate, however, that for every 1-per-cent decrease in ozone there will be a 2-per-cent increase in ultraviolet radiation.

Biologists, botanists, and physicians are only beginning to consider what the effects of increases in ultraviolet light might be.

"There are some very fundamental biological processes at the most serious level that could be affected by ozone depletion and about which we know almost nothing at all," said Margaret L. Kripke, a professor of immunology at the University of Texas cancer center in Houston. "We can't make any predictions about them."

Ms. Kripke, who was chairman of an Environmental Protection Agency panel on ozone that worked separately from the NASA group, said the most-often-cited potential effect of ozone depletion, skin cancer, which

F. Sherwood Rowland: "We're seeing severe damage now, and there's more coming."

is also the easiest to quantify, is probably the least important globally. The kinds of skin cancer involved, she said, would probably affect only Caucasians—a minority in the world's population. The increase in skin cancer would not show until after many years or even decades of increased exposure to sunlight.

More important, Ms. Kripke said, are the potential negative effects of increases in ultraviolet light on the immune system. Recent research, some of it done in her own laboratory, has indicated that too much ultraviolet radiation can activate particular cells that suppress immune-system activity in both animals and humans. Some of the research was done with laboratory rats. Other research was done with Australian volunteers who spent some extra time at the beach, and with psoriasis patients who were treated with ultraviolet light.

Such research, Ms. Kripke said, opens the possibility that widespread increases in ultraviolet light might result in depressed immune systems and a worldwide increase in infectious diseases.

Scientists have also speculated that the increased ultraviolet radiation might damage plants or kill aquatic microorganisms at the ocean's surface, cutting down on the amount of available food for animals and fish.

Scientists sponsored by the National Science Foundation went to Antarctica in October to try to determine the effect of ultraviolet radiation there on phytoplankton, a single-celled organism at the base of the food chain.

The Chief Culprits

Some scientists are suggesting that the new NASA study may necessitate opening negotiations again on the international treaty limiting production of chemicals known to destroy ozone. The chlorine-containing chlorofluorocarbons, found in automobile air conditioners, cleaning solvents, and some plastic foams, are considered the chief culprits in ozone destruction. The treaty was first signed by 31 countries last year and was ratified by the U.S. Senate last week.

The University of California's Mr. Rowland said the air now in Antarctica's stratosphere, where most ozone collects, comes from air that was circulating over mid-latitudes 10 years ago.

"Air with more chlorine in it is on its way to Antarctica," he said. "We're seeing severe damage now, and there's more coming."

He added: "The treaty calls for us to leap into action at the end of the 20th century."—DAVID L. WHEELER

RESEARCH NOTES

Intensified Sunlight; Slave Hiring; the Use of Stoning in Ancient Athens

Researchers at the University of Chicago have succeeded in concentrating sunlight to 60,000 times its normal intensity on the earth, more than three times the previous record.

The achievement, which took place last month on the roof of one of the university's buildings, was accomplished with an apparatus made from a telescope mirror 16 inches in diameter and a precisely machined, one-ounce cone of solid silver.

By concentrating light from the mirror, the apparatus enabled the scientists to reach an energy of 6 kilowatts per square centimeter.

Roland Winston, a professor of physics at Chicago, who developed the solar concentrator with Philip Gleckman, a graduate student, said the development could eventually help to produce efficient laser communication in space.—KIM McDONALD

Slave-Hiring System in Texas Analyzed

In Texas on the eve of the Civil War, the practice of leasing slaves to people who did not own them "gave many nonslaveholders a means of participating in the slave system," according to a historian at North Texas State University.

To find out who hired slaves in Texas, Randolph B. Campbell combed court records in 20 counties with large slave populations in the period from 1848 to 1862.

He found that 41 per cent of the hirers did not own any slaves. He also found that slave hirers were more likely than other heads of households to be native Southerners, to be in commercial or professional occupations, and to have above-average incomes.

Mr. Campbell reported his findings in the February issue of the *American Historical Review*.—KAREN J. WINKLER

Execution by Stoning Rarely Used in Athens

References to threats of stoning in Greek plays notwithstanding, it probably was not a common occurrence either before or during Greece's classical age, says a Fairfield University classicist.

Far from indicating that stoning was a widespread means of punishing crimes in Athens, "many of these references are to be understood, rather, in terms of a single event, the stoning of Lycides," Vincent J. Rosivach writes in the current (October 1987) issue of *Classical Antiquity*.

For entertaining enemy proposals that Athens surrender to Persia, the Athenian official Lycides was stoned to death in 479 B.C.

The rarity of such an event, and the fact that it happened during war, caused it to make a strong impression, says Mr. Rosivach, a professor of Greek and Roman studies. But it is very likely, he says, that Athenians considered the stoning of Lycides lawless and repellent, so that "it was transformed in the popular memory from an act of mob violence to a legitimate, if extreme, act of state."—ANGUS PAUL

White House Defends Proposal to Protect Scientific Data

Continued from Page A4

the field have occurred outside of the United States.

"Clearly, we are in no position to erect a wall around this field," he added.

The restrictions could prompt foreign scientists to retaliate by withholding data, he warned. It could also create bureaucracies charged with censoring scientific information and lower the quality of research.

"Nothing is more fundamental to scientific progress than the process of open encounter between scientists," said Mr. Park. "We read the papers of our colleagues, respond to their challenges in open debate, visit their laboratories, argue with them in the halls of our institutions. In the absence of this sort of open scientific scrutiny and debate, erroneous theories or sterile lines of inquiry become chronic."

Without the present policy of openly exchanging scientific information, said Dean E. Eastman, a vice-president at the International Business Machines Corporation's Research Division in Yorktown Heights, N.Y., "we would not have had the incredible developments we had in superconductivity."

"The rate of development would have been slowed down by factors of three, four, or five," he said.

Sen. Patrick J. Leahy, a Vermont Democrat who chairs the subcommittee, generally endorsed the viewpoints of the scientists, noting that it appeared to him the Administration's recent request to revise the information act was an effort "to eliminate a problem that doesn't exist and create a problem in trying to do it."

But Mr. Graham, the White House science adviser, maintained that a real problem existed, because scientists at federal laboratories were the targets of foreign competitors seeking information under the Freedom of Information Act.

He said that, while he was serving as Deputy Administrator of the National Aeronautics and Space Administration, the space agency had received several such information requests from Japanese scientists concerning its program in advanced communications technology.

"This is a form of compulsion which violates the scientific tradition," Mr. Graham said. "This is not done to university scientists, and it's not done to industrial scientists."

"I am in favor of scientific openness and freedom," he added, "but I am not in favor of compulsion."

9 Other Exemptions Approved

Mr. Graham said the proposed revision of the information act was not unusual, since Congress has approved nine other such exemptions. The last change was approved in 1985, when lawmakers gave the Secretary of Defense the authority to exempt the release of "sensitive, but unclassified" information of potential military value.

Mr. Graham said he also thought the Pentagon's authority to make such exemptions should be broadened to include other science agencies, such as the Department of Energy and NASA, to prevent the release of information on space-launch vehicles, ballistic-missile technology, and other technical information with potential military value.

"These should not be spread around the world," he emphasized.

Scientists at the Senate hearing, though, bristled at the idea of expanding the government's secrecy provisions. They warned that the White House's plan in its superconductivity act was so broad, it would exempt almost any type of scientific information from the information act.

"The only place in the Superconductivity Competitiveness Act that I am able to find the word 'superconductivity' is in the title," said Mr. Park. "Is it possible that this is an attempt to exploit the excitement created by recent discoveries in this field to further a much broader agenda?"

"Certainly the scope of the proposed legislation is breathtaking. It covers all 'commercially valuable scientific and technical information,' and in the accompanying analysis it says this clearly includes 'laboratory research that has potential for commercial application.' I have tried in vain to think of laboratory research that does not have that potential."

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Coach Is Cleared of Wrongdoing in Player's Death

Continued from Preceding Page

comments he had made in the local news media about cuts in the football program. Mr. Roach is also involved in a bitter feud with members of the university's faculty about his plans for the university's future. He has filed a libel suit against two professors (*The Chronicle*, March 9).

After he was fired, Mr. Kelly won an injunction from a local court that required West Texas State to fulfill the terms of his contract and forbade the university from hiring a new coach until Mr. Kelly could appeal his dismissal through the university's faculty-grievance process (*The Chronicle*, February 10).

That process was under way when the university issued its press release late last month. In occasionally graphic language, it accused Mr. Kelly of withholding information about football practice on the day of Mr. Johnson's death.

Based on what it called "previously unrevealed information," the release said Mr. Kelly had intensified training drills so much that Mr. Johnson collapsed during his second run through an obstacle course. The release quoted Butch Boegler, an assistant coach, as saying that Mr. Kelly had cut in half the amount of time the players were given to recover between runs of the course.

After Mr. Johnson collapsed, according to several unidentified players who were quoted in the release, Mr. Kelly screamed obscenities at him. The press release repeated the obscenities nearly word for word.

Mr. Johnson died the next day.

The release also stated that Mr. Kelly had failed to tell university officials who were looking into the death about the changes in the drill.

Because of the information in the release, Mr. Roach said he had asked the Texas Attorney General to investigate whether Mr. Kelly's behavior could invalidate his contract.

But after the press release was issued, Mr. Boegler, whose coaching position has been terminated because of budget cutbacks, said it had misquoted him. He said he had pointed out inaccuracies in the statement to Bruce Grimes, the athletics director, and Mr. Whittenburg before it was released.

Mr. Whittenburg said last week that he and Mr. Grimes had gone over the release with Mr. Boegler "sentence by sentence" before it was made public.

The inquiry by Mr. Sherrod, the district attorney, corroborated Mr. Boegler's contentions that he had informed university officials of inaccuracies in the press release. Mr. Sherrod also said that several players had challenged the release's account of events on the day Mr. Johnson died.

"I think they knew before it was released that the information might not be correct," he said of university officials.

The faculty senate is scheduled to set a date later this month for a hearing on Mr. Kelly's grievance proceedings. —DOUGLAS LEDERMAN

2 College Players, 7 High-Schoolers Died of Football-Related Injuries in 1987

CHAPEL HILL, N.C.

Two college players and seven high-school players died from football-related injuries in the 1987 season.

The total number of deaths was down sharply from 1986, when 19 players, including two at colleges, died from football-related causes.

Four deaths—all at the high-school level—were characterized as directly attributable to football, according to Frederick O. Mueller and Richard D. Schindler, who conducted the annual survey. "Direct" deaths are defined as those that result directly from participation in fundamental football skills such as tackling and blocking. In 1986, the study found that a decade-high 11 deaths were directly attributable to the sport.

Two of 1987's direct deaths resulted from head injuries, while the other two were caused by neck injuries, the report said.

Both of the college deaths were described as "indirectly" attributable to football, the study found. Indirect deaths are defined as those (such as cardiac arrest or heat stroke) caused by systemic failure as a result of exertion while participating in football, or by a complication that was secondary to a nonfatal injury.

The two college deaths in 1987 were caused by heart problems, Mr. Mueller said.

The study described the number of direct football deaths as "very low," considering that about 1.58 million people participated in the sport at the high-school, college, sandlot, professional, and semiprofessional levels.

Mr. Mueller is a professor at the National Center for Catastrophic Sports Injury Research at the University of North Carolina at Chapel Hill; Mr. Schindler is assistant director of the National Federation of State High School Associations.

They conduct the study each year for the American Football Coaches Association, the federation of high-school associations, and the National Collegiate Athletic Association.

Mr. Mueller said the 1987 figures represented a return to the pattern of reduced deaths that has been evident for the past decade.

The number could go higher, Mr. Mueller said, because three high-school players are still in comas because of injuries suffered last fall.

Here is how football-related deaths among college players have changed since 1977:

Year	Direct	Indirect	Total
1977	1	0	1
1978	0	1	1
1979	1	1	2
1980	0	0	0
1981	2	0	2
1982	0	3	3
1983	0	3	3
1984	1	0	1
1985	1	1	2
1986	1	1	2
1987	0	2	2

2-Year-College Athletic Group Expected to Strengthen Academic-Eligibility Rules

Continued from Preceding Page

of sports scholarships available at each college, set dates for intercollegiate teams' practice seasons, and limit the number of recruiting trips that junior college officials can take.

Mr. Witt said the new requirements would make N.J.C.A.A. rules easier to administer at each junior college. "This way," he said, "if a school has a real gung ho coach who wants to keep his team practicing long after other schools have stopped, the school can tell him, 'No, this is the national rule for the N.J.C.A.A. that this is the end of the season.' "

The association also is scheduled to vote on a proposal that would require junior-college athletes to sign a letter of intent committing themselves to attending a particular institution.

Some states already have letters of intent that apply to in-state junior and community colleges, but if a student who signs a letter with an in-state college decides to go to an out-of-state college, the letter of intent has no power.

The new national letter of intent is intended to provide a more uniform policy, Mr. Witt said.

—SUSAN OBERLANDER

People in Athletics

Tom Beck, men's basketball coach at Indiana U. of Pennsylvania, has resigned.

Jerry Chaplin, assistant women's softball coach at Wheaton College (Ill.), to women's softball coach.

J. O. (Bo) Coppedge, athletics director at the U.S. Naval Academy, will retire at the end of the academic year.

Gary T. Crompton, athletics director at Weber State College, will retire at the end of the academic year.

Julie Davis, women's basketball coach at Nebraska Wesleyan U., has resigned.

LaRue Fields, interim women's basketball coach at U. of Minnesota, to women's basketball coach.

Craig Littlepage, men's basketball coach at Rutgers U., has been dismissed.

Don Marsh, president of Players in Action, a consulting firm for professional athletes, to men's basketball coach at Elizabethtown College, not Franklin and Marshall College as was previously reported.

Dwight Montgomery, assistant football coach at Ohio Northern U., also to men's track and field coach.

Mike Price, football coach at Weber State College, also to athletics director at the end of the academic year.

Mike Ricciardi, women's basketball coach at Ramapo College of New Jersey, has resigned.

Hugh Schintzius, women's volleyball coach at Mansfield U. of Pennsylvania, has resigned.

Marvin Vanover, athletics director at Augusta College, will resign upon appointment of a successor.

Bob Weltlich, men's basketball coach at U. of Texas at Austin, has been dismissed.

ATHLETICS NOTES

NFL Approves Team's Move to Arizona State's Stadium

National Football League owners voted last week to give the St. Louis Cardinals permission to move to Arizona, where the newly named "Phoenix Cardinals" will play in Arizona State University's Sun Devil Stadium.

Arizona State officials spent much of the fall negotiating the team's move with representatives of the Cardinals and the city governments of Phoenix and Tempe, promising to add 60 luxury sky boxes to the 75,000-seat Sun Devil Stadium before the 1989 season.

William V. Bidwill, the Cardinals' owner, signed a 10-year lease with the university. Arizona State is expected to gain about $2-million a year in ticket, concession, and parking revenues from the agreement.

Mr. Bidwill, who decided to move from St. Louis's 54,000-seat Busch Stadium after the average attendance at games dropped last season to a record low of 27,821, has a contract provision that would allow him to move to a domed stadium in downtown Phoenix, if one were built.

—SUSAN OBERLANDER

Ala. Grand Jury Convicts Sports Agent of Tampering

Jim Abernethy, who admitted making payments to a former football player at Auburn University, was found guilty by an Alabama jury of tampering with a sports event, a misdemeanor.

Mr. Abernethy was sentenced to a year in jail. He and his lawyers said they were confident the conviction would be overturned on appeal. He was found not guilty of commercial bribery and violation of deceptive trade law.

The charges against Mr. Abernethy stemmed from his dealings with Kevin Porter, a former Auburn star. He admitted to paying the athlete $3,800. —DOUGLAS LEDERMAN

10 Who Signed With Agents Will Repay Scholarships

At least 10 of the football and basketball players who testified before a federal grand jury investigating sports agents have agreed to pay back part of their college scholarships to avoid federal prosecution, the Atlanta *Constitution* said in a copyright story.

The repayment, along with a year of community service under the supervision of a probation officer, is part of a program being offered to most of the 60 or so athletes who testified before a grand jury in Chicago investigating the actions of Norby Walters and Lloyd Bloom, two New York–based sports agents, the *Constitution* reported.

All of the players admitted signing with the two agents, violating National Collegiate Athletic Association rules, while representing themselves to their institutions as amateurs.

The players who agreed to pay back their scholarships, the *Constitution* said, include Cris Carter, a former Ohio State University football player who is now playing professionally with the Philadelphia Eagles. —D.L.

Athletes' Positive Drug Tests Were Underreported by S.C.

Drug tests conducted at the University of South Carolina found that athletes tested positive for drugs more than 80 times since September 1985, according to documents released by the university last week.

Paul Akers, the athletics-department physician who administered the drug-testing and counseling program, had reported that fewer than 10 athletes had tested positive for drug use each year since 1985.

The university released the results of 1,383 urinalysis tests of South Carolina athletes that had been conducted since 1985 in response to a request under the Freedom of Information Act by *The State*, a Columbia, S.C., newspaper.

In early March, the university's athletics director, Bob Marcum, and Dr. Akers were fired for their handling of the drug-testing program. The university's president, James B. Holderman, said the program had been "misrepresented" by Mr. Marcum and Dr. Akers.

A committee investigating the program found that the university had conducted no random drug tests of athletes since the spring of 1986 and had conducted only one-third of the required drug screenings since 1985.

Mr. Holderman is awaiting recommendations from the committee on possible changes in the drug-testing program. —S.O.

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